KERRY KLUSSMAN
2315 N. 82nd St.
Seattle, WA 98103
(206) 706-6887

EDUCATION:

Bachelor of Science, Biology
Seattle Pacific University, 1991

EXPERIENCE:

Sr. Research Associate, 3/04-present

Seattle Genetics, Inc.
Supervisor: Dr. Julie M. McBarchern
Department: Biochemistry

Position has focused on pre-clinical studies to assess the use of company molecules in immunological disease settings. Responsibilities have involved the planning, implementing and analysis of experiments, and included activities of:

---*In vitro* activation of T lymphocytes (via antigen-specific, allogeneic, or mitogenic stimulation) and phenotypic characterization of lymphocyte subsets via flow cytometry.
---Characterizing the induction and kinetics of expression of activation markers targeted by company molecules on human lymphocyte subsets.
---Evaluation of lead antibody and antibody-drug conjugates on activated Tcell subsets utilizing multi-parameter flow cytometric analysis, cytotoxicity and proliferation assays.

Sr. Research Associate, 4/00-3/04
Research Associate, 8/99-4/00

Seattle Genetics, Inc.
Supervisor: Dr. Alan Wahl
Department: Biochemistry

Position has involved pre-clinical research in the areas of tumor biology and immunology focused around the company's lead agents (antibody-based molecules to treat cancer). Projects have included:

---Assess phamacokinetics of immunotoxin (via in vitro growth inhibition assay) in patient plasma samples.
---Isobologram studies: examined the responsiveness of various human carcinoma lines to combination treatment with immunotoxin and standard chemotherapeutics.
---Developed and conducted assays (FACS, growth inhibition, cytotoxicity) to assess the activities of antibodies that are under development on normal cells and transformed lines of various hematologic malignancies.

EXHIBIT 1

Research Associate III, 1/98-3/99

Xcyte Therapies, Inc.
Supervisor: Dr. Martha Hayden Ledbetter
Department: Molecular Biology

Position involved working on multiple team-oriented projects which required a variety of skills in molecular biology, immunology, and tissue culture. Responsibilities included:

---Isolation and construction of antibody domains in expression vectors. Involved PCR-isolation from cDNA, sub-cloning and screening of transformants by plasmid mini-prep and sequence analysis. Performed plasmid preps of constructs for mammalian expression (COS and CHO). Transfected and analyzed supernatants for antibody production (SDS-PAGE, Western blot and ECL).
—Screening of phage display libraries: performed methods in propagation, amplification and screening. Involved in development of methods for panning, and the screening of phage isolates by FACS and ELISA.
---Cloning and expression of soluble fusion proteins for use in screening assays.
---Performed ribonuclease protection assays (RPA) for analysis of mRNA species during T-cell activation.

Associate Research Scientist II, 12/95-9/97
Associate Research Scientist I, 6/94-12/95
Assistant Research Scientist II, 2/93-6/94

Bristol-Myers Squibb Pharmaceutical Research Institute
Supervisor: Dr. Robert S. Mittler
Department: Autoimmunity and Transplantation

Position involved studies focused on the regulation of immune responses through the targeting of lymphocyte cell-surface antigens. Responsibilities included:

—Assessing *in vitro* effects of monoclonal antibodies directed against human and murine cell surface antigens on lymphocyte activation and effector functions (thymidine uptake and chromium release assays).
---Isolation of genomic clones for use in gene knock-out strategies.
---Cloning and expression of single-chain antibody binding fragments (sFv's) and sFv-immunotoxin conjugates.
—Studying the regulation of tyrosine phosphorylation of intracellular proteins in T-cells after mAb cross-linking of cell surface antigens (via immunoprecipitation and Western blot analysis).
---Isolation of human and murine lymphocytes from whole blood and lymphoid tissues.

Assistant Research Scientist I, 6/91-2/93
Lab Assistant (work/study program), 10/90-6/91

Bristol-Myers Squibb Pharmaceutical Research Institute
Supervisor: Dr. Nitin K. Damle
Department: Cellular Immunology

Laboratory activities focused on studying the regulatory role of various lymphocyte adhesion molecules on the activation of human T cells. Responsibilities included:

---Production of adhesion molecule Ig fusion proteins by recombinant DNA transfections in COS cells.
---Protein A purification of Ig fusion proteins.
---Perform in vitro assays to measure functional effects of Ig fusion proteins on T cell populations including thymidine incorporation assays and ELISA.
---Isolation of lymphocyte subsets from whole blood by panning, magnetic bead separation and rosetting techniques.
---FACS analysis of lymphocyte subsets via indirect/direct immunofluorescent staining.

PUBLICATIONS:

1. Klussman K, Mixan B.J., Cerveny C.G., Meyer D.L., Senter P.D., Wahl A.F. Secondary mAb—vcMMAE conjugates are highly sensitive reporters of antibody internalization via the lysosome pathway. Bioconjug Chem. 2004 Jul-Aug;15(4):765-73.

2. Francisco J.A., Cerveny C.G., Meyer D.L., Mixan B.J., Klussman K, Chace D.F., Rejniak S.X., Gordon K.A., DeBlanc R., Toki .BE., Law C.L, Doronina S.O., Siegall C.B., Senter P.D., Wahl A.F. cAC10-vcMMAE, an anti-CD30-monomethyl auristatin E conjugate with potent and selective antitumor activity. Blood. 2003 Aug 15;102(4):1458-65. Epub 2003 Apr 24.

3. Wahl A.F., Klussman K, Thompson J.D., Chen J.H., Francisco L.V., Risdon G., Chace D.F., Siegall C.B., Francisco .JA. The anti-CD30 monoclonal antibody SGN-30 promotes growth arrest and DNA fragmentation in vitro and affects antitumor activity in models of Hodgkin's disease. Cancer Res. 2002 Jul 1;62(13):3736-42.

4. Mittler R.S., Bailey T.S., Klussman K., Trailsmith M.D., and Hoffman M.K. Anti-4-1BB Monoclonal Antibodies Abrogate T Cell-dependent Humoral Immune Responses In Vivo through the Induction of Helper T Cell Anergy. J Exp. Med. Nov 15: 190:1535-1540, 1999.

5. Shuford W.W., Klussman K., Tritschler D.D., Loo D.T., Chalupny J., Siadak A.W., Brown T. J., Emswiler J., Raecho H., Larsen C.P., Pearson T.C., Ledbetter J.A., Aruffo A., Mittler R.S. 4-1BB costimulatory signals preferentially induce CD8+ T cell proliferation and lead to the amplification in vivo of cytotoxic T cell responses. J Exp. Med. Jul 7; 186:47-55, 1997.

6. Winberg G., Grosmaire L.S., Klussman K., Hayden M.S., Fell H.P., Ledbetter J.A., and Mittler R.S. Surface Expression of CD28 Single Chain Fv for Costimulation by Tumor Cells. Immunol. Rev. 153, 209-253, 1996.

7. Mittler R.S., Schieven G.L., Dubois P.M., Klussman K., O'Connell M.P., Kiener P.A., and Herndon V. CD45-mediated Regulation of Extracellular Calcium Influx in a CD4-transfected Human T Cell Line. J. Immunol. 153(1):84-96, 1994.

8. Damle N.K., Klussman K., Leytze G., Myrdal S., Aruffo A., Ledbetter J.A., and Linsley P.S. Costimulation of T Lymphocytes with Integrin Ligands Intercellular Adhesion Molecule-1 or Vascular Cell Adhesion Molecule-1 Induces Functional Expression of CTLA-4, a Second Receptor for B7. J. Immunol. 152(6):2686-97, 1994.

9. Damle N.K., Klussman K., Leytze G., Aruffo A., Linsley P.S., and Ledbetter J.A. Costimulation with Integrin Ligands Intercellular Adhesion Molecule-1 or Vascular Cell Adhesion Molecule-1

Augments Activation-Induced Death of Antigen-specific CD4+ T Lymphocytes. J. Immunol. 151(5):2368-79, 1993.

10. Damle N.K., Leytze G., Klussman K., and Ledbetter J.A. Activation with Superantigens Induces Programmed Death in Antigen-primed CD4+ Class II+ Major Histocompatibility Complex T Lymphocytes via a CD11a/CD18-dependent Mechanism. Eur. J. Immunol. 23(7):1513-22, 1993.

11. Damle N.K., Klussman K., Leytze G., Ochs H.D., Aruffo A., Linsley P.S., and Ledbetter J.A. Costimulation via Vascular Cell Adhesion Molecule-1 Induces in T Cells Increased Responsiveness to the CD28 Counter-receptor B7. Cell. Immunol. 148(1):144-56, 1993

12. Damle N.K., Klussman K., Leytze G., and Linsley P.S. Proliferation of Human T Lymphocytes Induced with Superantigens is not Dependent on Costimulation by the CD28 Counter-receptor B7. J. Immunol. 150(3):726-35, 1993.

13. Damle N.K., Klussman K., Linsley P.S., Aruffo A., and Ledbetter J.A. Differential Regulatory Effects of Intercellular Adhesion Molecule-1 on Costimulation by the CD28 Counter-receptor B7. J. Immunol. 149(8):2541-8, 1992.

14. Damle N.K., Klussman K., Dietsch, M.T., Mohagheghpour N., and Aruffo A. GMP-140 (P-selectin/CD62) Binds to Chronically Stimulated but not Resting CD4+ T Lymphocytes and Regulates Their Production of Proinflammatory Cytokines. Eur. J. Immunol. 22(7):1789-93, 1992.

15. Damle N.K., Klussman K., Linsley P.S., and Aruffo A. Differential Costimulatory Effects of Adhesion Molecules B7, ICAM, LFA-3, and VCAM-1 on Resting and Antigen-primed CD4+ T Lymphocytes. J. Immunol. 148(7):1985-92, 1992.

16. Damle N.K., Klussman K., and Aruffo A. Intercellular Adhesion Molecule-2, a Second Counter-receptor for CD11a/CD18 (Leukocyte Function-associated Antigen-1), Provides a Costimulatory Signal for T-cell Receptor-initiated Activation of Human T Cells. J. Immunol. 148(3):665-71, 1992.